

# **Historic, Archive Document**

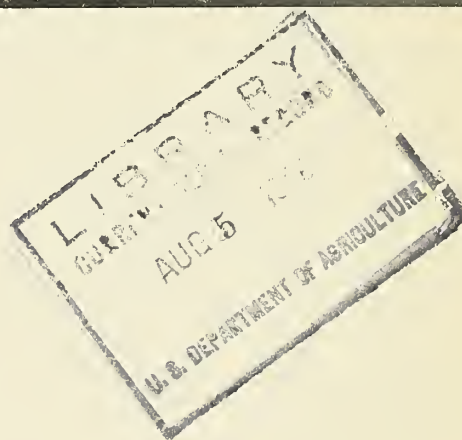
Do not assume content reflects current scientific knowledge, policies, or practices.



JUNE 1948

1.942  
ARM 34  
3

# MARKETING ACTIVITIES



U. S. Department of Agriculture  
Production and Marketing Administration  
Washington 25, D.C.

IN THIS ISSUE:

LIVESTOCK DEVELOPMENTS AND PROSPECTS

By Charles A. Burmeister . . . . . Page 3

After reviewing the last eventful year in the livestock business, the author takes a look ahead.

BARRIERS TO TRUCKS RESTRICT MARKETS FOR FARM PRODUCTS

By William C. Crow . . . . . Page 10

The motortruck has expanded the farmer's market and brought the housewife much nearer the time when she can buy most farm products all the year round. Shall we continue to place the truck under one restriction after another--and so keep the farmer and the consumer from getting the full benefits? Mr. Crow is director of PMA's Marketing Facilities Branch.

BARGAIN IN MILK

By H. L. Forest . . . . . Page 12

Compared with other foods, how high in price is milk?

BAKERS AND THE R. & M. ACT

By Philip Talbott . . . . . Page 14

One probable result of research under the new act is that more bakery products will be eaten, less will go to waste.

MARKETING BRIEFS . . . . . Page 17

Address all inquiries to  
The Editor, Marketing Activities  
Production and Marketing Admin.  
U. S. Department of Agriculture  
Washington 25, D. C.

Material in Marketing Activities  
may be reprinted without special  
permission.

Issued monthly. Vol. 11, No. 6

# Livestock Developments and Prospects

By Charles A. Burmeister

Last year was a most eventful one for the livestock business and especially for cattle producers. Several new records were made, some of which may hold for several years. The combined slaughter of cattle and calves reached an all-time high of slightly more than 36 million head. Beef output from this slaughter was of record volume. Despite this large slaughter, prices of all grades of cattle and calves reached new peaks--quotations that would have been considered fantastic had they been mentioned before the war. These prices reflected the changes in the money income of consumers resulting because of the high level of employment and the increase in wages and salaries paid. Disposable income per person in 1947 averaged more than \$1,200 compared with slightly over \$500 in the 5 years just before the war. The increase in income was not accompanied by a comparable increase in output of goods and services. Hence a general rise in prices was inevitable as people tried to buy what they wanted with the additional money they had to spend.

## Largest Per Capita Consumption Since 1908

Because of the record slaughter of cattle last year, meat consumption increased to an average of more than 155 pounds per person--the largest per capita average since 1908. Total meat output was 23.4 billion pounds, the fourth largest of record and was only exceeded during three of the war years when more hogs and sheep were slaughtered and much of the production went to our allies and to our armed forces.

The number of cattle and calves slaughtered in 1947 exceeded the estimated calf crop by about 700,000 head. Only 74,000 cattle were imported as contrasted with more than half a million in 1946 when imports were available from Mexico. Imports from Mexico are no longer permitted because of foot-and-mouth disease in that country. The 1947 imports were mostly dairy stock from Canada. In 1947, cattle slaughter and death losses combined were sufficient to reduce total cattle numbers by 2.6 million head.

Numbers are now 7 million less than the all-time peak reached 3 years earlier, and are near where they were 6 years ago, shortly after the United States entered the war. The decrease in cattle numbers in the last 3 years was relatively greater in dairy cattle than in beef stock. Milk cows and heifers over 1 year old decreased more than 3.2 million head, whereas beef breeding stock decreased only 900,000. Steer numbers also were reduced sharply, decreasing by 1.5 million in the last 3 years. These changes in cattle numbers indicate that dairymen culled their herds closely as labor and feed costs increased. Beef cattle producers, however, tended to hold their breeding herds unchanged in numbers and sold a larger than usual proportion of their steers and young stock, thereby reducing their reserves for future marketing. The beef cattle herd now contains a larger proportion of cows in relation to other cattle than at any time on record, and the smallest proportion of steers



since 1940.

The sharp rise in cattle prices after the discontinuance of price controls in late 1946, together with the uncertainty as to what future prices might be, apparently caused cattlemen to sell more than the usual proportion of their steers and younger cattle. This appears to have resulted in the availability of fewer cattle for sale as stockers and feeders last fall and this spring, and it may tend to cut down the number of such cattle for sale next fall.

The proportion of the calf crop sold for slaughter last year was the largest of record--nearly 39 percent compared with about 35 percent in 1946 and about 30 percent in the early years of the war. The proportion of the crop carried into 1948 was the smallest since 1926.

Slaughter of steers and heifers was unusually large during the first half of 1947, but it tended to decrease towards the end of the year. This indicated that cattlemen were then less willing to sell what they had on hand, or had already sold most of what they had planned to sell. Because of the smaller corn crop produced, feed supplies were less plentiful and much higher in price than in the fall of 1946. Prices of feeder cattle also were much higher, and the heavier and older cattle were in greater demand for feeding than calves. This was because they required less feed and involved less financial risk, since they would be on feed a shorter time before they were sold. Shipments of calves to the country from the four larger markets during the last half of 1947 were the smallest in 13 years and 36 percent less than a year earlier.

#### Decrease in Number of Cattle on Feed

The number of cattle on feed at the beginning of 1948 was 12 percent less than a year earlier, and in the Corn Belt States the decrease was much greater. Shipments of cattle for feeding and grazing thus far this year have been far below the record shipments of last year, and are the smallest since 1941. On April 1, the number of cattle on feed in the Corn Belt was down 25 percent from a year earlier, the decrease amounting to nearly half a million head. This large reduction in the number of cattle now on feed, along with the small number of calves bought for feeding last fall, indicates a relatively small supply of fed cattle for slaughter this summer and fall. The decrease will probably be most marked in the better grades of fed steers. The market situation at that time may be much like that of 1925 and 1937, following years of short corn crops. During the late summer of those 2 years the prices of the better grades of cattle rose sharply and there was considerable complaint in some of the larger cities about the rise in meat prices.

Marketings of cattle this year have reflected the drop in cattle numbers and the decrease in the number of cattle fed. Receipts of cattle at all public stockyards during the January-April period were 21 percent less than a year earlier and the smallest for the period since 1943. Federally inspected slaughter of cattle in the 4 months was down 16 percent, and in April it was down 25 percent. Some of the decrease in March and April may have resulted because of the packinghouse strike

which caused a considerable number of the larger plants to cease operating while the strike was in progress. There is reason to believe, however, that much of the decrease in slaughter reflects the availability of fewer cattle for market--particularly of steers and heifers. The greatest relative decrease in slaughter from last year has been in heifers. During the first part of 1947, heifer slaughter was unusually large.

Total slaughter of cattle and calves this year is now indicated as likely to be about 33 million head, or about 3 million fewer than in 1947. If the percentage calf crop and death losses are about average, total cattle numbers at the end of the year will show a further reduction of about 1 1/2 million head and be about 1 million larger than in 1942.

### Decline in Sheep Numbers

One of the most significant developments in the livestock situation during and following the war was the tremendous reduction in sheep numbers. After reaching an all-time peak of more than 49 million head at the beginning of 1942, stock sheep numbers have been decreasing since, and at the beginning of this year they totaled only 30.5 million. Numbers now are 39 percent less than 6 years ago and are the smallest since the Civil War. This year's lamb crop will probably be the smallest in the last 50 years and the output of lamb and mutton is expected to be the smallest since 1929, and about 30 percent less than the record production of 1943.

The decline in sheep numbers resulted primarily because production costs for sheep increased more in relation to returns than production costs for other commodities, and many sheep raisers found alternative enterprises more attractive. The difficulty of getting and retaining competent herders and the comparatively low prices for wool in relation to prices of other commodities were factors causing sheepmen in the West to liquidate their flocks.

There are some indications now that the downward trend in sheep numbers is about ended, although numbers at the end of this year may show a further moderate decrease. Nine of the Western States and two of the Plains States carried over more ewe lambs for breeding stock this year than they did in 1947, the increase in these States amounting to 250,000 head.

Rebuilding of sheep flocks is expected to be gradual and probably will be confined mostly to the Western States and to Texas, where competition for the available grazing resources tends to favor sheep raising. In most of the farm-flock States little increase in sheep numbers is to be expected because land-utilization practices there will tend to be more favorable for cattle.

Because of the small size of last year's corn crop, the present trend in hog production is downward. Hog slaughter this year is expected to be about 69 million head compared with 76 million head last year. In June last year farmers indicated they intended to produce about 9 per-



cent more fall pigs than in the fall of 1946, but the unfavorable prospects for corn during the summer caused them to cut down the increase to 3 percent. These fall pigs are now coming to market.

In December, farmers reported intentions to breed 11 percent fewer sows for farrowing pigs this spring. Hog producers in the Corn Belt reported they planned an even greater reduction. The hog-corn ratio has since become progressively less favorable because hog prices have declined relatively more than corn prices.

The spring pig crop this year is now expected to total about 48 million head. This is about 5 million fewer than last year, and is the smallest spring crop in the last 10 years. These pigs will reach market next fall and winter, which means less pork than last winter.

Because of the need for larger supplies of meat for our increasing population, the U. S. Department of Agriculture is asking farmers this spring to increase the 1948 fall pig crop by at least 10 percent over last year. In view of the present unfavorable hog-corn price ratio, now much below average, it appears doubtful that this increase in the fall pig crop will be obtained unless farmers' response to the price situation differs from their response heretofore when conditions were similar to those now present. If the corn crop this year proves to be at least average in yield, there will be great need for more livestock to utilize it. Hog producers, therefore, should find it to their advantage to raise more fall pigs this year and to increase their spring pig crop next year.

#### This Year's Production May Be Smallest Since 1941

Meat production this year is expected to total about 21 billion pounds, or 10 percent less than last year, and to be the smallest output since 1941. The percentage decrease is not expected to vary greatly among the four types of meat (beef supplies will probably be down most and veal supplies least). The decrease in total meat output from last year will be most marked in the last quarter when the decrease in the 1948 spring pig crop will be reflected in hog marketings. If there is a good corn crop this fall, farmers will probably tend to market their hogs late so as to utilize more of their corn supplies. Pork output from commercial slaughter in the last quarter of the year, therefore, may be down around 20 percent from the previous year. The total supply of all meats at that time will probably be down about 15 percent. Meat production in the first quarter of this year was about 6 percent less than a year earlier. Output in the second quarter apparently will be down at least 10 percent and possibly more, since it is affected to some extent by the strike of packinghouse employees. Production in the third quarter also is expected to be down about 10 percent.

Because of the decrease in meat production this year, the per capita consumption of meat will be only about 143 pounds, or about 12 pounds less than last year. If the fall pig crop this year is not increased somewhat over last year, total meat production in 1949 is likely to be



even smaller than that of this year. More beef may be available in the first half of 1949, assuming that there will be more fed cattle then because of more plentiful feed supplies, but there will be less pork and also probably less lamb and mutton. In the latter half of 1949, beef output probably will be smaller than in the corresponding period this year. Looking beyond 1949, there probably will be a further cut in beef and veal production, especially if efforts are made to start increasing cattle numbers by marketing fewer cattle and calves for slaughter. The output of pork will depend on the production of corn this fall and next year, and on the relationship of corn prices to hog prices in the next 2 or 3 years.

Last year retail meat prices rose from early February to mid-September, with the greater part of the advance occurring after the middle of May. The rise followed about the usual seasonal pattern but the extent of the advance was greater than average. Prices of pork rose 20 percent, those of lamb 25 percent, while prices of better grades of beef advanced more than 35 percent. Livestock prices reflected the rise in retail meat prices.

The seasonal decline in prices after September was less than usual and was checked in December, whereas it usually continues into February. An upward movement in December and January was accompanied by considerable public comment about inflation and high prices of meat.

#### Price Break Last February

When the sharp break in grain prices occurred early in February, prices of other commodities also declined. In late February and early March, retail meat prices were down 15 to 20 percent from the all-time peak levels reached last September. Practically all the drop in retail prices of beef and lamb from the September peak has since been recovered, but there has been only slight recovery in the retail prices of pork from the low point of late February.

The February price break received much publicity and caused some concern as to whether it was the beginning of a general decline in all prices which would lead to an extended recession, such as that which started in late 1920 shortly after the first World War. Except for the drop in grain prices, however, the decline was comparatively moderate and there has since been considerable recovery in prices of cattle and lambs. Prices of hogs, however, have continued to show much weakness and have lost ground in relation to prices of corn and other livestock.

The decline in prices of heavy hogs has been unusually great and has not been reflected in comparable declines in prices of hog products. Much of this decline apparently has resulted because labor difficulties since the middle of March caused the discontinuance of slaughter operations by many of the plants which normally buy most of the heavy hogs. This reduced not only the available plant capacity for slaughtering hogs but also the buying competition.

The rise in meat prices last year generally reflected the increase

in money income of consumers resulting from the higher wages and salaries paid and the general high level of employment. Total monthly personal income increased about 11 percent from January to September 1947, when retail meat prices reached their peak, then declined moderately as a result in part of seasonal curtailment of employment and rose to a new all-time high in January. Income in March this year was about 9 percent greater than in March last year, and retail prices of lamb and beef at that time and in early April were up 14 and 23 percent from a year earlier. Prices of pork, however, were down 6 percent. Making allowance for the smaller supplies of beef and lamb this year, and the increase in income of consumers, the demand for meat this spring does not appear to be so strong as it was a year ago. This may be because greater supplies of other consumer goods are now available to compete with meat and because consumers may have less accumulated savings available for spending.

### Production Depends on Grazing and Feed Grain Resources

Any further increases in the level of wages and salaries may be expected to be accompanied by a further rise in meat prices, but this fact would not necessarily make more meat available for purchase. In the long run, meat production depends on grazing and feed grain resources, which tend to be fixed within certain limits and are governed to a large extent by weather conditions. Since increases in wages and salaries ordinarily result in higher prices for the goods farmers and stockmen buy, and thus increase farm production costs, the rise in meat prices that accompanies a rise in wages and salaries does not necessarily serve as an incentive to increase meat production by raising more feed and more livestock.

Because of foot-and-mouth disease in Mexico, the importation of Mexican cattle into this country is prohibited and this is causing cattlemen and packers in Texas and the Southwest to look to other sources for supplies of cattle for grazing and slaughter. For the first time, large numbers of Florida cattle are being shipped west to stock Texas, Oklahoma, and Colorado pastures. Packers in California are finding it necessary to go farther east to get needed slaughter supplies for their plants. These developments may bring about important changes in the price structure and in competitive relationships between regions, and be particularly important to cattlemen in the Great Plains area.

Stockmen in making their plans for the years ahead need to consider how much meat this country can produce with its feed and grazing resources. During the last 30 years cattle numbers have tended to increase at about the same rate as horse and mule numbers have declined, so that the total number of grazing animals has kept within a fairly narrow range. Expressed in units equivalent to one milk cow, the yearly totals during the last 50 years have fluctuated between 74 and 91 million, and have averaged about 81 million. The total this year is 78 million, which is 4 percent less than the long-time average and 12 percent below the last recent peak reached in 1944. Further decreases in grazing animals are to be expected during the next few years, as horse and mule numbers continue to decrease and as cattle numbers continue their pres-



ent downward trend.

The number of grazing animals maintained in this country during the last three decades indicates that our grazing resources have a capacity of 85 to 90 million animal grazing units during years of fairly favorable weather, but in years of below-average rainfall of probably between 75 and 80 million. Because of the possibilities in any year of drought in some part of this vast western range country, the maintenance of numbers at the higher level tends to increase producers' risks. In some of the southern States the grazing capacity is probably greater than the maximum number of animals maintained there in past years. If these States should make full use of their resources the maximum capacity of the entire country is probably near 95 million grazing units during years of favorable weather.

U. S. Grazing Resources by 1950 Might Maintain a  
January 1 Cattle and Calf Inventory of 95 Million

Allowing for the probably continued decline in horses and mules during the next decade and for some increase in sheep, our grazing resources if fully used 10 years hence could probably maintain a January 1 inventory of about 95 million cattle and calves, or about 10 million more than the all-time peak reached 3 years ago. This number of cattle would permit a yearly slaughter of about 36 million cattle and calves and hold numbers about constant from year to year, assuming that imports or exports of live cattle amounted to little or nothing. This level of slaughter is the same as the record slaughter of last year.

The downward phase of the present cattle cycle is now in its fourth year and is not likely to end before 1950 at the earliest. The main influence in this downward trend is different from influences in the past, when usually times were bad or prices were low, or there was drought on the range. This time cattlemen are marketing their herds more closely because prices are higher than ever before, and they are uncertain how long these prices will continue. The trend can be reversed only when stockmen feel enough confidence in the future to start holding more breeding stock and marketing fewer animals than the number of calves raised. When that time comes there will be less beef and veal on the market temporarily, but in the long run it will work to the advantage of consumers.

If we are to maintain meat supplies during the years ahead when less beef and veal is expected to be available, it will be necessary to raise more hogs. Hog production depends on corn. During the past decade corn production has averaged 2.9 billion bushels and the production of pork has averaged 3.7 pounds for each bushel raised. A corn crop of 3 billion bushels will enable farmers to raise 80 million hogs for slaughter. Slaughter of hogs this year is expected to be about 69 million head compared with 74 million last year. A reduction of a million head in the slaughter of cattle and calves needs to be offset by an increase of about 2 1/2 million hogs if the meat output is to be held unchanged.



# Barriers to Trucks Restrict Markets for Farm Products

By William C. Crow

We can all remember when we ate oranges mostly at Christmas, when broccoli was unheard of, when lettuce came only out of a garden nearby, and when fish were available only on Friday. Small towns could not handle carlots of most foods, and less-than-carload lots were received from the terminal market 75 miles away only by mixed-car delivery. Under such conditions the consumer simply did without some products all of the time and most products some of the time, and this market for agricultural products did not exist.

Now the picture has changed. Consumers in the smaller cities can usually get oranges, lettuce, tomatoes, and many other perishable foods throughout the year and any day in the week. Avocados, cherries, and strawberries are frequently available, and fish can be had as often as they are wanted. We are approaching the situation where most products of American farms are displayed before the housewife all the time.

What accounts for this change? The motortruck. It has been one of the most important factors in broadening the market for products of the American farm and in giving the consumer a greater year-round variety of food.

The small city or town still cannot handle carloads, but it can handle truckloads brought regularly from the terminal markets 75 to 150 miles away. Nearly all supplies of perishable foods reach the smaller town by motortruck either from the not-too-distant market or directly from producing areas.

The truck not only feeds the small town; it is becoming increasingly important in bringing products ever-increasing distances from producing areas to the terminal markets. Nearly half the receipts of fresh fruits and vegetables arrive at the large terminal wholesale market centers by truck, and even larger proportions of poultry, eggs, and livestock move to market this way.

## Reasons for Increased Use

There are several reasons for this increased use of trucks in distributing food, but probably the most important is their flexibility. Trucks can move large or small quantities. Products can be picked up on the farm and moved directly to the wholesalers' warehouses, a large proportion of which are not located on railroads. Highways run from everywhere to everywhere. It is physically possible for trucks to start out anywhere and go anywhere. In many instances days can be cut from the time required for distribution by use of trucks. Products have been moved by truck from Florida to California in less than four days. In

many cases costs of marketing have been reduced through the use of the truck by eliminating certain operations, bypassing obsolete facilities, and offering lower freight rates.

These advantages of the truck must be preserved if that method of transportation is to continue to aid the farmer in marketing the larger and larger quantities which he is so abundantly able to produce, and in bringing a higher standard of living to consumers throughout the Nation. This flow of food through the marketing channel can be dammed up or retarded by needless restrictions on truck movement even more effectively than a stream can be held back by a dam. Water can go over the dam, but undue interference with trucks can stop some of the flow entirely. The truck is physically able to do the job. The big question is, "Will man let it?"

Ever since the truck's invention, man has been devising one method after another to retard its use and to keep the farmer and the consumer from reaping the full benefits from it. Instead of adapting ourselves fully to it, we have placed on it one restriction after another for the purpose of keeping the composure of some of us from being disturbed by a change in our established ways of doing things.

The maximum benefits which could be derived from the use of the truck in food transportation will not be obtained by erecting one barrier after another across its path. We do not expand the market for farm products, improve the consumer's standard of living, or aid the growth of the trucking industry by making trucking inflexible through undue regulation of routes, the raising of trucking charges every time the rates of a competing form of transportation are increased, or an unnecessary lack of uniformity in size and weight requirements. Farmers, consumers, and members of the trucking industry have a common interest in seeking to remove all barriers which would unnecessarily restrict the flow of the products of the American farm to the dinner tables of the Nation. The prosperity and well-being of the farmer, the transportation agency, and the consumer depend on keeping those tables well supplied with the proper variety and quantity of nourishing foods.

. . .

#### PART OF FOOT-AND-MOUTH QUARANTINE LINE MOVED FARTHER SOUTH

A section of the northern quarantine line maintained across Mexico by joint Mexican and United States forces to prevent the spread of foot-and-mouth disease is being moved farther southward, USDA announced late in April. The action reduces the size of the quarantined area by more than 1,000 square miles and increases the distance between that section of the line and the border by 40 miles in some places. The action was the second of its kind in 6 weeks. The new area freed from quarantine is triangular shape, and is bounded approximately by lines between three cities--San Luis Potosi, Aguascalientes, and Zacatecas. Extensive veterinary inspections of susceptible livestock within that area revealed no signs of the disease.



# Bargain in Milk

By H. L. Forest

Milk is the source of many of the major nutrients required for human growth. Pound for pound, milk and its products are better balanced and more nutritious than most other foods. "True enough," many a consumer will say, "but I, for one, can't afford them."

Can't he? Granted that he must eat, perhaps it lies nearer to the truth to say he can't afford not to eat milk and milk products. Are the prices for them really too high--as compared, that is, with the prices of other foods?

Let's compare the cost of obtaining certain essential food nutrients from milk and other dairy products with the cost of obtaining them from other foods. Using the Bureau of Labor Statistics average retail prices for February 1948, we find that a dollar spent on fresh milk will buy an average of 3,296 calories, 168 grams of protein, 5,660 milligrams of calcium, 7,606 international units of vitamin A, and 8 milligrams of riboflavin, as well as lesser amounts of other nutrients. The same dollar spent on chicken, round steak, veal outlets, smoked ham, or loin pork chops will buy considerably less of each of these nutrients except vitamin A. Of course, no one food is expected to provide all the nutrients the body requires, but milk comes as close to being a complete food as any, and among the foods commonly consumed, it is one of the cheapest nutrient sources.

## Relative Price Increases

This element of amount and variety of nutrients per dollar cost of foods is particularly important today. Prices of practically all goods are relatively high, and consumers are more cost-conscious than ever. The Bureau of Labor Statistics survey of retail food prices indicates that food prices as a whole rose 12.3 percent between February 15, 1947, and February 15, 1948. In the same period dairy prices rose 11.6 percent. The Bureau's retail price index of foods is divided into a number of general categories, of which one is dairy products. The index shows that between June 15, 1946, and February 15, 1948, the prices of four of the major food groups increased more than the average of dairy prices. Meats rose 68 percent, fats and oils (excluding butter) rose 54 percent, beverages 63 percent, and cereals and bakery products 41 percent--whereas dairy products (including butter) rose only 38 percent. The only major categories that showed a smaller price increase than the dairy groups were sugars and sweets, fruits and vegetables, and eggs.

When incomes increased during the war, consumption of fluid milk and most of the products made from whole milk increased. If more milk had been available, consumption would probably have increased even more. This does not mean that per capita consumption of all milk and milk products on a butterfat-equivalent basis increased significantly. In fact, the per capita consumption on this basis is now about the same as in the



5 years just before the war. However, the form in which it was consumed changed toward a greater utilization of all milk solids. The consumption of fluid milk and cream in 1947 was about 17 percent above the prewar average, but moderately below the record level of 1945. The per capita consumption of canned whole milk and cheese was about 20 percent greater than the prewar average, and about the same as in 1946. The consumption of ice cream was more than double the prewar average. The reason for the sharp increase in ice cream consumption is now known for certain, but it is pretty clear that a greater awareness of the value of ice cream as a food has been a contributing factor. In contrast, the consumption of butter has been reduced by about one-third as compared with the prewar rate. The production of butter has declined as more milk has been used in whole milk products and as milk production in the major butter-producing areas has decreased. This decline in butter consumption has been offset to some extent by the sharp increase in the consumption of the nonfat portion of the milk.

### Prospects

During the rest of 1948, some rather discouraging developments are in prospect. Although the food value of milk and dairy products is well known, production of them is not keeping up with need. In fact, milk production is actually declining while the population is increasing at a record rate. Milk production reached a peak in 1945 of 870 pounds per capita. By 1947, it has declined to 829 pounds. Further declines are indicated for 1948. The reasons for the decline in milk production are fairly easy to see. In 1947, the number of milk cows declined for the fourth successive year. At the beginning of 1948, cow numbers were 3.6 percent less than a year earlier and the smallest since 1940. Until recently the effects of the reduction in cow numbers were partly offset by increased production per cow.

Let's glance briefly at some implications of the European Recovery Plan. During and immediately after the first World War we exported a large volume of dairy products; we were, in fact, a net exporter until 1923. But during most of the time between the two world wars our exports of dairy products were insignificant and we imported more than we exported. During World War II we again exported large volumes of dairy products, especially cheese, evaporated milk, and dried milk. Since that war ended, exports have declined slightly; they were somewhat less in 1947 than in 1946.

A further decline in the volume of exports of these products seems indicated. The countries that do not get assistance under the recovery program will be shorter of dollar exchange than they have been since the end of the war. The countries that do get assistance may be expected to receive smaller total exports of dairy products than in any recent year.

To sum up, a smaller potential foreign demand is indicated for the months ahead, but a production decline and a maintained domestic demand should keep prices at least as high as in 1947--perhaps somewhat higher. Even so, milk and dairy products--an indispensable part of our diet--should continue to be a relatively cheap source of food.

# Bakers and the R. & M. Act

By Philip Talbott

If the per capita consumption of bakery products in this country increases considerably during the next decade or so, one reason for it will probably be the work now under way in the bakery research project conducted under the Research and Marketing Act of 1946.

Under the act, the Secretary of Agriculture may conduct and stimulate research into the laws and principles underlying basic agricultural problems. The object of this research is to develop new and improved methods of producing, marketing, distributing, processing, utilizing, and maintaining the quality of plant and animal commodities--at all stages from the original producer to the ultimate consumer. This includes research on human nutrition and the nutritive value of farm products and the foods processed from them.

The baking industry processes for human consumption more farm products than any other segment of the processing industry as a whole. The baking industry buys a large part of all the flour milled, all the sugar, fats, processed milk and cream, and large quantities of many other bakery product ingredients.

## Staling and Loss of Flavor

During the war, eminent authorities found that several essential vitamins and minerals were generally lacking in the average American diet. The combined efforts of these authorities led to the enrichment of bread and rolls, which was a start toward assuring consumers reasonable quantities of vitamins and minerals in bakery products. But no matter how good these products come to be nutritionally, they must be palatable and they must not be wasted if the consumer is to benefit. There is too much waste in the home from staling and loss of flavor.

It is time the baking industry as a whole learned more about the physical and chemical changes that take place during the processing of bakery products. Most of the research by bakers has been done with an eye to competition. If all bakers joined hands to support the efforts now being made to acquire knowledge of this kind, ways to prevent undesirable processing changes and to advance desirable changes would be easier to find.

As soon as the Research and Marketing Act became law, a research project for the baking industry was proposed. Authority was requested to determine the causes of the staling and flavor deterioration of bakery products. Top-ranking scientists employed by the bakers were gathered and the Baking Industry Research Advisory Council was formed. This group of scientists met with representatives of the U. S. Department of Agriculture at Washington. The bakery products research project was proposed. It was approved by the administrator of the Research and Marketing Act. USDA contracted with the American Institute of Baking, a



nonprofit, noncompetitive scientific institution in Chicago, to do the research. The contract was awarded to an agency outside the Government under a provision in the act that authorizes such contracts when the research can be "carried out more effectively, more rapidly, or at less cost" than the research could be conducted by the Department of Agriculture. The project got started January 18, 1948.

Here is how the scientists said it should be conducted:

1. Survey and study available scientific and trade literature on the subject of staling and flavor deterioration of these products; report study findings to USDA, identify literature and data, and name the methods considered essential to the successful completion of this project.

2. Compile available unpublished data accumulated by Government agencies, educational institutions, and private industries.

3. Study the effects of variations in temperature and humidity.

4. Make a study, in at least three geographical areas, of the temperatures and the time of day when bread and rolls are loaded at the bakery, delivered on the bread route, and displayed or stored in the grocery, the restaurant, and the home.

5. Correlate this information on commercial handling conditions with that obtained through laboratory study under controlled conditions, in order to evaluate the improvement in condition that may result from changing the handling methods.

6. Report research progress periodically, and on completion of the study, recommend changes in handling and distribution methods that will improve the product that reaches the consumer.

The first contract made under the research project deals with bread and rolls, but the work is expected to yield information about flavor loss and staling of other yeast-raised products, such as sweet goods. Later, chemically leavened products may be investigated.

#### Measuring Bread-Baking Qualities of Wheat

In another project new methods and official standards for measuring the bread-baking quality of wheat will be sought. Contracts for the work have been awarded to Doty Technical Laboratories and C. J. Patterson Company, both of Kansas City (Mo.); Ingman Laboratories, Minneapolis; and Omaha Grain Exchange Laboratories, Incorporated, Omaha. Department grain specialists point out that bread-baking quality should be one of the principal factors in determining the grade and classes of wheat used for bread purposes. Present official grain standards do not fully meet this requirement. In recent years wheat growers and processors have often asked for a better measure of the bread-baking qualities of individual lots of wheat. Success of this project would make it possible to pay premiums to farmers who grow better quality wheat and to test the bread-baking quality of a new wheat variety before it is



released to growers. Under the four contracts, the laboratories will make scientific studies of various classes of wheat and will report findings to USDA. Milling, baking, and other tests useful in indicating bread-baking quality will be made by the contractors.

On March 23, the Baking Industry Research Advisory Council developed an outline for the next series of bakery products studies that it will recommend. This outline calls for an investigation of the effect of every ingredient and chemical that bakers use in processing bread and rolls. It also calls for a study of fermentation, make-up methods, proofing, baking, cooling, wrapping and slicing, and distribution. The entire study might take 3 years to complete.

. . .  
.

#### THIGPEN NAMED DIRECTOR OF PMA TOBACCO BRANCH

James E. Thigpen has been named director of PMA's Tobacco Branch to succeed C. E. Gage, who retires May 31 after more than 42 years of continuous service with the U. S. Department of Agriculture.

Thigpen, whose appointment becomes effective June 1, was born and reared in North Carolina. After attending Guilford College in that State, he graduated from the University of Connecticut, attended Harvard University, and spent a year in research work at Massachusetts State College. In 1933 he joined the staff of the Tobacco Section of the Agricultural Adjustment Administration and in 1942 transferred to the Commodity Credit Corporation, as assistant to the president of the Corporation.

Joining the Army in May 1943, he served in the Quartermaster Corps until September 1945. He then returned to the Department of Agriculture as assistant director of PMA's Tobacco Branch, the position he now leaves to become director.

Gage was born in Nebraska, reared in Missouri, and has been a resident of Virginia since 1909. He first joined the staff of the U. S. Department of Agriculture in January 1906. in the Forest Service. He transferred to the Bureau of Plant Industry two years later, and to the Bureau of Crop Estimates (later the Division of Crop and Livestock Estimates) in 1914. During his service with these agencies he began to specialize in tobacco, beginning a career that earned him recognition as one of the leading tobacco authorities in the country.

In 1929, when the Tobacco Section was established in the Bureau of Agricultural Economics, Gage was appointed its first chief. He continued in this position until named chief of the Tobacco Division of the newly created Agricultural Marketing Service in 1939. After continuing in charge of tobacco work during the war years, he was appointed director of the Tobacco Branch of the Production and Marketing Administration when that agency was formed in August 1945.

## MARKETING BRIEFS:

Dairy Products.--Between April 17 and May 17, PMA announced the following activities concerning milk marketing agreements and orders: Scheduled public hearings for the presentation of proposals to amend orders at Kansas City, Mo., Topeka, Boston, Minneapolis-St. Paul, and the Tri-State (counties in Kentucky, Ohio, and West Virginia) milk marketing area; announced the amendment of orders for Cincinnati, Cleveland, Toledo, Columbus, Dayton-Springfield, the Tri-State area, and the Quad Cities (Moline, East Moline, and Rock Island, Ill., and Davenport, Iowa); and postponed until June 2 a public hearing on a proposal to establish a marketing agreement and order to regulate milk handling in the Rockford-Freeport, Ill., milk marketing area.

Eggs.--A program for the purchase of dried eggs as a price-support measure was announced by USDA on May 4. Egg driers were being notified that offers of dried eggs would be received by the Poultry Branch of the Production and Marketing Administration from May 11 until further notice, for delivery within 30 days following acceptance of offers. Under the Steagall Amendment, USDA is required to support the prices of eggs at a national average of 90 percent of parity. Since January, prices had averaged around the required support level. But in recent days, the announcement said, egg prices to producers and in terminal markets had declined to levels which necessitated support operations to hold producer prices at levels that would reflect at least 90 percent of parity on a national basis. The program is the first direct price-support operation for eggs by the Department this year. It is designed to provide producers with a market outlet at specified prices for eggs which may be in excess of current demand for immediate consumption or storage. It will apply primarily in the Midwest, the area of heaviest production of shell eggs.

Fats and Oils.--Toward the end of April, USDA announced the removal of import controls on castor beans and castor oil and reinstated the controls on flaxseed and linseed oil from Canada and Mexico. The actions were taken through amendments to War Food Order 63, which controls the importation of various fats and oils.... Authorization to import 5,000 metric tons of palm oil without restriction as to end use was announced May 4. The oil will probably be used in the manufacture of soap and textiles.

Flax.--Sales of 398,774 pounds of fiber flax from stocks held by the Commodity Credit Corporation were announced by USDA on May 4. These sales complete the disposal of all CCC stocks. Over 1,100,000 pounds of fiber flax had been acquired by CCC on August 22, 1947, under that agency's price-support program for the commodity.

Fruits.--USDA has recommended the adoption, subject to industry approval, of amendments to the Georgia peach marketing agreement and order program. The principal amendments recommended would (1) authorize establishment of minimum standards of quality and maturity; (2) extend the duties of the Industry Committee to include additional activities;



(3) provide payment of compensation and reimbursement of expenses to members and alternate members of the Distributors' Advisory Committee; and (4) eliminate the biennial referendum.... USDA on May 6 recommended adoption of a proposed marketing agreement and order program for the handling of fresh peaches produced in North Carolina and South Carolina. The proposed program would authorize regulation, by grade, size, quality, and maturity, of shipments of peaches to points outside the two States.... USDA announced on April 21 that a hearing on a proposed marketing agreement and order program regulating the handling of Emperor grapes had been requested by California Emperor grape growers and shippers.... USDA announced on May 7 that purchases of surplus dried fruits of the 1947 production were being resumed. The fruit--dried apples, apricots, dates, figs, peaches, prunes, and raisins--will be used in domestic school lunch and institutional feeding programs and for export to occupied areas and to countries receiving assistance under the Foreign Assistance Act.

Grain and Grain Products.--Recent purchases of flour by the Commodity Credit Corporation included 130,380,000 pounds (2,934,000 bushels of wheat equivalent) on April 21, for delivery to Gulf coast ports; 103,880,000 pounds on May 4, for delivery to east coast ports; and 144,480,000 pounds on May 5, for delivery to Gulf coast ports.... USDA estimated on May 12 that 1,027,000 long tons (39,055,000 bushels) of U. S. grain and grain products were exported in April. This raised the total for the 10 months ending with April to 12,807,000 long tons (493,851,000 bushels), compared with 10,993,000 long tons (427,255,000 bushels) during the same period in 1946-47.

Livestock.--USDA on April 30 urged hog producers to increase pig production this fall by at least 10 percent to provide a minimum of 34,400,000 pigs--3,000,000 more than the total produced in the fall of 1947. These pigs would be marketed as hogs in the spring and summer of 1949.

Potatoes.--USDA has announced its recommendation that no further action be taken at present toward development of a proposed potato marketing agreement program for Nebraska and Wyoming, because producers in those States have shown insufficient interest in the subject.... USDA announced May 10 that a proposed Federal marketing order for potatoes in North Carolina and five counties in Virginia had been favored in a recent referendum by growers producing 78.5 percent of the volume of potatoes grown in the area.

Tobacco.--USDA has designated the tobacco auction markets at Hughesville, La Plata, Upper Marlboro, and Waldorf, Md., for the free and mandatory inspection and market news service. In a referendum, 73.4 percent of the growers voting favored this designation. The tobacco inspection law requires that before a market or group of markets may be designated for the service, at least 66 2/3 percent of those voting must favor the action.... The volume of 1947-crop marketings of dark air-cured tobacco was the smallest, but the average price per pound was the highest, since 1943.



## ABOUT MARKETING:

The following statement, addresses, and publications, issued recently, may be obtained upon request. To order, check on this page the items desired, detach and mail to the Production and Marketing Administration, U. S. Department of Agriculture, Washington 25, D. C.

### Addresses and Statement:

America, Unlimited, by Charles F. Brannan, Secretary of Agriculture, at Burlington, Iowa. May 1, 1948. 12 pp. (Mimeographed)

Statement in regard to H. R. 6054 before the House Agriculture committee by N. E. Dodd, Under Secretary of Agriculture. May 4, 1948. 13 pp. (Mimeographed)

Agriculture's Position and Responsibility in World Affairs, by Nathan Koenig, Executive Assistant to the Secretary of Agriculture, at Storrs, Conn. April 28, 1948. 13 pp. (Mimeographed)

Dairy Industry Statesmanship, by Nathan Koenig, Executive Assistant to the Secretary of Agriculture, at Syracuse, N. Y. May 25, 1948. 7 pp. (Mimeographed)

### Publications:

Farmers' Produce Markets in the United States: Part 1--History and Description. (USDA) January 1948. 147 pp. (Multilithed)

Los Angeles Wholesale Market Prices, Fruits and Vegetables, 1947. (PMA and California Department of Agriculture) 23 pp. (Mimeographed)

Marketing Northwestern Fresh Prunes, Season 1947. (PMA) 15 pp. (Mimeographed)

Marketing Kern District Early Long White Potatoes--Summary of 1947 Season. (PMA and California Department of Agriculture) 45 pp. (Mimeographed)

Marketing Western New York Green Wrapped Tomatoes--Summary of the 1947 Season. (PMA and New York State Department of Agriculture and Markets) March 1948. 5 pp. (Mimeographed)

Marketing Western New York Peaches--Summary of the 1947 Season. (PMA and New York State Department of Agriculture and Markets) March 1948. 5 pp. (Mimeographed)

Marketing Western New York Green Wrapped Tomatoes--Summary of the 1947 Season. (PMA and New York State Department of Agriculture and Markets) March 1948. 5 pp. (Mimeographed)

